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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/665,467	09/22/2003	Ben E. Boatwright	0671/8	5520

7590 04/18/2006

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EXAMINER	
SCHATZ, CHRISTOPHER	

ART UNIT	PAPER NUMBER
1733	

DATE MAILED: 04/18/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/665,467	BOATWRIGHT ET AL.	
	Examiner	Art Unit	
	Christopher T. Schatz	1733	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *06 April 2006*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-20* is/are pending in the application.

4a) Of the above claim(s) *4,5 and 12* is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-3,6-11 and 13-20* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *17 February 2004* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Election/Restrictions

Applicant's election of Species A2 and Species B1 has been acknowledged. As a result of applicant's amendment to claims, the species restriction between Species A1 and Species A2 has been withdrawn. Claim 12 is withdrawn as being drawn to a non-elected invention (Species B2).

Claim Rejections - 35 USC § 112

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 1-3, 6-11, and 13-20 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

3. Claim 1 recites the limitation " a binding fabric adhered on at least one side with an adhesive tape on both faces thereof " There is insufficient antecedent basis for this limitation in the claim. It is unclear to examiner what "faces" applicant is referring to. Exmainer recommends applicant replace the phase "an adhesive tape on both faces thereof" with the phase "double-sided adhesive tape."

4. Claim 6 recites the limitation "applying a bead of glue between a lower aspect of said carpet and said edge." Because applicant never refers to the "lower aspect" in the specification or drawings it is unclear to examiner what part of the carpet constitutes the "lower aspect."

5. Claim 7 recites the limitation "binding material is attached to the inside of said carpet." Applicant should note that it is not clear what part of the carpet applicant referring to when applicant states "the inside of said carpet." Clarification is requested.

6. Claim 17 recites the limitation "wherein a metal element is included within or against said thermal plastic adhesive." There is insufficient antecedent basis for this limitation in the claim because neither claim 10 nor claim 6 recite a thermal plastic adhesive.

Claim Rejections - 35 USC § 103

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

8. Claim 1 is rejected under 35 U.S.C. 103(a) as being unpatentable over Hamrah '698 in view of Mitchell '327.

Hamrah discloses a method of binding an edge of a material without stitching, the binding to said material comprising a binding fabric (figure 1) adhered on at least one side with an adhesive tape on both faces thereof 30 (column 2, lines 17-31), and securing said material to be bound to said binding fabric by said adhesive tape 30 extending from said binding fabric (figures 1, 2, column 2, line 8 – column 3, line 8).

The reference is silent as to securing a welting material in a pocket. Mitchell discloses a method for binding an edge of a material 15 (figure 3), said method comprising securing a

welting material 12 in a pocket formed by folding over a binding fabric 11 on itself (figures 1 and 2), and securing said material to bound the binding fabric wherein the end of said material is abutting said welt (column 2, line 58 – column 3, line 8). Mitchell discloses welting cords are well known in the art and advantageous because said welting cords reinforce and decorate the edge of the material (column 1, lines 6-10). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Hamrah '698 such that binding fabric 22 is folded over on itself to form a pocket in which a welting material can be secured. By modifying Hamrah in such a way, the binded edge of the material in Hamrah would be favorably reinforced and provide an aesthetically pleasing appearance as taught by Mitchell above.

9. Claims 2 and 3 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hamrah and Mitchell as applied above, and in further view of Callas '202 and Ang (US 2002/012376).

Hamrah and Mitchell disclose a method as stated above, but the references are silent as to placing a bead of adhesive in between said material and the welt. Callas discloses a method of binding an edge of a material, said binding material comprising a binding fabric 22 with an adhesive, and the reference further discusses the drawbacks of the method of Hamrah – namely that the method of Hamrah fails to properly prevent water and dirt from accumulating between the binding material and the edge of the material (column 1, lines 24-35). Callas proposes that to solve this problem the edge of the material can be adhesively secured to the bottom portion of the binding fabric *and* the side portion of the binding fabric via adhesive 33 (column 1, lines 51-60, column 5, lines 4-20). Examiner acknowledges that the Callas discloses a strip of adhesive, however, Ang et al. discloses that it is well-known in the art to use a bead of adhesive in place of an adhesive strip when bonding the side edge of a material to a binding fabric (paragraph 0013).

Additionally, Ang et al. discloses that it is well known to use a thermoplastic adhesive in place of an adhesive strip (paragraph 0053). Thus, at the time of the invention it would have been obvious to a person of ordinary skill in the art to modify the method disclosed by the combination of Hamrah and Mitchell by placing an adhesive in between the material and the welt formed over the adhesive strip as taught by Callas above such that both the bottom of the binding fabric and the side portion of the binding fabric containing the welt is bonded to the edge of the material. Making such a modification would prevent water and dirt from accumulating in between the edge of the material and the portion of the binding fabric containing the welt. Additionally, at the time of the invention it would have been obvious to a person of ordinary skill in the art to use a thermoplastic adhesive bead for the adhesive to be placed in between the material and the welt because Ang et al. teaches above that doing so is an alternative to the adhesive strip 33 of Callas.

As to claim 3, Callas et al. teaches that an adhesive is pre-applied to element 18 and subsequently bound by melting of the thermoplastic. While examiner acknowledges that Callas et al. does not explicitly disclose that element 18 is a "welt" examiner asserts that one of ordinary skill in the art reading Callas would have readily recognized that an adhesive could be pre-applied to the welt of Mitchell since element 18 performs a similar function (reinforcement) as the welt in the method of Hamrah and Mitchell performs. Applicant should further note that it would have been obvious to a person of ordinary skill in the art to use a thermoplastic hot-melt bead in place of Callas' strip 33 for the reasons discusses above. Therefore, at the time of the invention it would have been obvious to a person of ordinary skill in the art to pre-apply a thermoplastic adhesive bead to a welt and subsequently bound said adhesive bead by a heating means.

10. Claims 6-9, 14, and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hamrah in view of Callas and Ang et al.

Hamrah discloses a method of binding an edge to a carpet, said method comprising: securing a piece of binding material to said edge so that it extends outwardly along one side of said edge; attaching said piece to an underside of said carpet so that said edge abuts said carpet (figure 2, column 2, line 8 – column 3, line 8). The reference is silent as to applying a bead of glue between a lower aspect of said carpet and an edge. Callas discloses a method of binding an edge 18 to a carpet 11, and the reference further discusses the drawbacks of the method of Hamrah – namely that the method of Hamrah fails to properly prevent water and dirt from accumulating between the binding material and the edge of the carpet (column 1, lines 24-35). Callas proposes that to solve this problem, the lower aspect of the carpet can be adhesively secured to the bottom portion of the binding fabric and the edge via adhesive 33 (column 1, lines 51-60, column 5, lines 4-20). Examiner acknowledges that Callas discloses a strip of adhesive, however, Ang et al. discloses that it is well-known in the art to use a bead of adhesive in place of an adhesive strip when bonding the lower aspect of a carpet to an edge (paragraph 0013). Therefore, at the time of the invention it would have been obvious to a person of ordinary skill in the art to modify the method disclosed by Hamrah by placing a bead of glue in between the lower aspect of the carpet and an edge as suggested by Callas and Ang et al. and permitting said glue to cure whereby said lower aspect of said carpet is bonded to said edge. Making such a modification would prevent water and dirt from accumulating in between the edge and the lower aspect of said carpet.

As to claim 7, Hamrah discloses a method wherein the piece of binding material is attached to the inside of said carpet by disposing a planar material 30 between the bottom of said carpet and said piece of material, said planar material having an adhesive on both sides thereof (figure 2, column 2, lines 17-38). As to claim 8, Ang et al. discloses a method wherein said bead of glue is composed of a thermal plastic adhesive (paragraph 0053). As to claim 9, it should be noted that Ang et al. discusses the use of hot melt adhesives. Examiner asserts that it would have been well within the purview of one of ordinary skill in the art to apply the hot-melt thermoplastic adhesive bead of Ang et al. with a hot glue gun as is well known in the art.

As to claim 14, Hamrah discloses a method wherein a protective material 32 on the upper side of said planar material is removed before said planar material is secured by said adhesive to the bottom of said carpet (figure 1, column 2, lines 32-35). As to claim 19, Hamrah et al. discloses a method wherein said edge comprising a binding. Applicant should note that the edge 22 is formed of a "carpet binding tape" and thus examiner asserts that "carpet binding tape" reads on the term binding.

11. Claims 10, 11, 13, and 15-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hamrah, Callas and Ang et al., as applied above, and in further view of Mitchell.

Hamrah, Callas, and Ang et al., discloses a method as stated above, but the references are silent as to an edge wherein said binding material is wrapped around a welt material. Mitchell discloses a method of binding an edge to a carpet 15, wherein said method comprises securing a piece of binding material 11 to an edge; attaching said piece to an underside of the carpet such that said edge abuts said carpet, wherein said edge comprises binding material wrapped around a welt material 12 (figures 1-3, column 2, line 57 – column 3, line 8). Mitchell discloses welting

cords are welt known in the art and advantageous because said welting cords provide reinforcement and decorative effects (column 1, lines 6-10). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the method of Hamrah such that the edge of binding material 22 disclosed by Hamrah is wrapped around a welt material. By modifying Hamrah in such a way, the binded edge of the material in Hamrah would be favorably reinforced and provide an aesthetically pleasing appearance as taught by Mitchell above.

As to claim 12, Mitchell discloses a method wherein said welt material is substantially circular in cross-section (figures). As to claim 13, examiner asserts that it would have been well within the purview of one of ordinary skill in the art to the increase the angle between the lower aspect of the carpet and the edge to receive the bead of glue. Performing such a step would increase the space necessary for the hot glue gun used to dispense said adhesive, and also reduce the risk of glue adhering to any of the carpet naps or fibers. Examiner further asserts that after said bead of glue is applied, one of ordinary skill in the art would naturally decrease the angle before said glue is cured such that said edge is properly positioned when the glue cures. As to claim 15, Mitchell discloses a method wherein said edge comprises cord (figures). As to claim 16, Mitchell discloses a method wherein said edge comprises binding material 11 which has been stitched such that it encircles a welt material (figures 1, 2, column 2, lines 61-66). As to claim 18, Mitchell discloses a method wherein said edge comprises piping (figures). As to claim 19, Mitchell discloses a method wherein said edge comprises a binding (figures). As to claim 20, Mitchell discloses a method wherein said welt material consists of welt material which is

substantially circular in cross-section or welt material which is substantially D-shaped in cross-section or a combination thereof (figures).

12. Claim 17 is rejected under 35 U.S.C. 103(a) as being unpatentable over Hamrah, Callas and Ang et al. as applied above, and in further view of Kim et al. '524.

Hamrah, Callas and Ang et al. disclose a method as stated above, but the references are silent as to a metal element within said adhesive wherein said metal element heats and melts said adhesive when subjected to radiation. Kim is directed to a bonding method and discloses that it is well known in the art to melt thermoplastic adhesive material by subjecting a radio frequency (RF) sensitive material inside said thermoplastic resin to radiation such that said RF sensitive material heatsup and melts the adhesive (column 2, lines 34-44, column 4, lines 24-46). The reference further discloses that metal can comprise one such RF sensitive material. The advantage of using metal as an RF sensitive material and subjecting said thermoplastic adhesive to radiation is that by doing so, one avoids subjecting the product being bonded to high temperatures, thus reducing the risk of damaging the material. Furthermore, because metal has a higher RF sensitivity than thermoplastics, use of metal accelerates the melt rate of the thermoplastic. Therefore, at the time of the invention it would have been obvious to a person of ordinary skill in the art to modify the method disclosed by Hamrah, Callas and Ang et al. by placing metal elements in the thermoplastic adhesive bead and subjecting said bead to radiation such that said metal heats up and melts the thermoplastic adhesive bead as taught by Kim et al. above. Such a modification would reduce the risk of damaging the carpet or edge and also speed up the melting rate of the thermoplastic adhesive bead.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Christopher T. Schatz whose telephone number is 571-272-1456. The examiner can normally be reached on 8:00-5:30, Monday -Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Crispino can be reached on 571-272-1226. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Christopher T. Schatz

STEVEN D. MAKI
PRIMARY EXAMINER

4-14-06